



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER OF PATENTS AND TRADEMARKS
Washington, D.C. 20231
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/547,663	04/12/2000	EMI TAKABAYASHI	A-355	6241

802 7590 01/06/2003

DELLETT AND WALTERS
310 S.W. FOURTH AVENUE
SUITE 1101
PORTLAND, OR 97204

[REDACTED]
EXAMINER

CHANG, AUDREY Y

ART UNIT	PAPER NUMBER
2872	

DATE MAILED: 01/06/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)
	09/547,663	TAKABAYASHI ET AL.
	Examiner	Art Unit
	Audrey Y. Chang	2872

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 28 October 2002.
- 2a) This action is FINAL. 2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.
- 4) Claim(s) 1-18 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) Claim(s) _____ is/are allowed.
- 6) Claim(s) 1-18 is/are rejected.
- 7) Claim(s) _____ is/are objected to.
- 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on _____ is/are: a) accepted or b) objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) The proposed drawing correction filed on _____ is: a) approved b) disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.
- 12) The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) All b) Some * c) None of:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
a) The translation of the foreign language provisional application has been received.
- 15) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) Notice of References Cited (PTO-892) 4) Interview Summary (PTO-413) Paper No(s). _____.
 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) Notice of Informal Patent Application (PTO-152)
 3) Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____. 6) Other:

DETAILED ACTION

Remark

- This Office Action is in response to applicant's amendment filed on October 28, 2002, which has been entered as paper number 13.
- By this amendment, the applicant has amended claims 1, 8, 10, 14, 15 and 16.
- Claims 1-18 remain pending in this application.
- The rejections to claims 1-14 and 17-18 under 35 USC 112, second paragraph, set forth in the previous Office Action dated April 26, 2002 **still hold**.

Response to Amendment

1. The amendment filed on October 28, 2002 is objected to under 35 U.S.C. 132 because it introduces new matter into the disclosure. 35 U.S.C. 132 states that no amendment shall introduce new matter into the disclosure of the invention. The added material, which is not supported by the original disclosure, is as follows: *claim 1 has been amended* to include the phrase "multilayer hologram". The specification only gives support for having different layers of holograms being laminated together to form multilayer holograms but not a single hologram in a multilayer. A single hologram in a multilayer is not possible in the art.

Applicant is required to cancel the new matter in the reply to this Office Action.

Claim Rejections - 35 USC § 112

2. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

Art Unit: 2872

3. **Claims 1-7, 14, and 17-18 are rejected under 35 U.S.C. 112, first paragraph,** as containing subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. The reasons for rejection based on the newly added matters are stated in the paragraph above.

4. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

5. **Claims 1-14 and 17-18 are rejected under 35 U.S.C. 112, second paragraph,** as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The reasons for rejection are set forth in the previous Office Action dated April 26, 2002.

It still not clear what is considered to be the “combined”. It is not clear if the combination means the combination between reflection and volume type or the combination between the color pattern of plane characters or image and the three-dimensional subject image.

Claims 8-13 are rejected under 35 U.S.C. 112, second paragraph, as being *incomplete* for omitting essential steps, such omission amounting to a gap between the steps. See MPEP § 2172.01. *The reasons for rejection are set forth in the previous Office Action dated April 26, 2002.* The claims fail to provide steps for **actually** recording the subject image and a color pattern of the plane characters or image. If these images are holographic type then the process of recording either holographically with two interference beams or embossing method should be stated in order to make the claims operable. The claims (particularly claim 8) as stand now are descriptive but without *essential* steps for carrying out the process.

Claim Rejections - 35 USC § 103

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. **Claims 1-3 are rejected under 35 U.S.C. 103(a) as being unpatentable over the patent issued to Waitts.**

The reasons for rejection are set forth in the previous Office Action dated April 26, 2002.

Claim 1 has been amended to include the features of single layer hologram or multiple layer of hologram. It is noted that the specification does not support for a multilayer hologram as stated in the paragraph above and there is no such thing as a multilayer hologram in the art. Waitts teaches the hologram may be a single layer hologram, (12 or 14, as in Figures 2 or 3).

Claims 1 has been amended to include the feature having the plane character or image is on other than a surface of the hologram. Waitts teaches that graphic material with the combined holographic areas (12, 14 and 16), each contains a hologram, and the diffraction grating areas (24, 26, and 28), each contains a diffraction grating producing two dimensional rainbow effect, wherein the diffraction grating areas are on a different physical surface of the holographic areas, (please see Figure 1). Furthermore, Waitts teaches that the viewing conditions for the holograms and for the diffractive rainbow effect are different such that the holograms are more direction sensitive, which means the visual appearance for the hologram and the diffraction grating may occur at different location or surface. Waitts teaches particularly that the visual images of the holograms and the diffraction gratings may be made overlapping with each other. Since the hologram images are three-dimensional images and the diffraction images are two-dimensional images such overlapping implies that the two types of images will not be at one surface.

8. **Claims 4-7, 14 and 18 are rejected under 35 U.S.C. 103(a) as being unpatentable over the patent issued to Waitts as applied to claims 1-3 above, and further in view of the patent issued to Cowan.**

The reasons for rejection are set forth in the previous Office Action dated April 26, 2002.

Claim 14 has been amended to include the feature of having the subject hologram plate and the character hologram plate being separately made. The combined references does not teach such feature explicitly, however using *master* hologram to record hologram is notoriously old in the art, as demonstrated in the teachings of Cowan, to use separate mater holograms as alternative means for making the holographic areas and the diffraction areas are considered to be obvious matters of design choices to one skilled in the art, since such manufacturing technology is standard in the art.

9. **Claims 8-13 and 15-16 are rejected under 35 U.S.C. 103(a) as being unpatentable over the patent issued to Waitts in view of the patent issued to Cowan.**

The reasons for rejection are set forth in the previous Office Action dated April 26, 2002.

Response to Arguments

10. Applicant's arguments filed on October 28, 2002 have been fully considered but they are not persuasive.

11. In response to applicant's arguments concerning the amended features in the claims, the features have been fully addressed in the paragraphs above.

12. In response to applicant's arguments concerning the cited Waitts reference does not teach a "combined reflection and volume type hologram" the examiner respectfully disagrees for the reasons stated below. Firstly, the claims still fail to clarify what does it mean by such phrase. Secondly, the

Art Unit: 2872

graphic material taught by Waitts has *combined* holographic areas and diffraction areas and is of reflection type holographic and grating. The feature concerning the hologram and diffraction grating to be volume type is implicitly included, since in general embossed relief type of fringes are volume type fringes. It is well known in the art that the phrase "volume type" is referred to hologram/grating having a ratio for the fringe size of the hologram/grating to the layer thickness satisfies certain criterion. Volume type hologram/grating is very standard in the art it certainly does not carry any novel patent weight.

13. In response to applicant's argument, which states that the cited Waitts reference does not teach a color hologram, the examiner respectfully disagrees and wishes to point the applicant's attention to column 6 and line 63 wherein a "visible light hologram" is formed. A visible light hologram means a hologram is reconstructed by a visible light, i.e. a color light, to display a color hologram image.

14. In response to applicant's argument, which states that the cited Waitts reference does not meet the language of claims 1-3, the examiner respectfully disagrees and wishes to direct applicant's attention to the paragraph above concerning the rejections of such claims.

Conclusion

15. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of



Creation date: 07-19-2004

Indexing Officer: QNGUYEN5 - QUANG NGUYEN

Team: OIPEBackFileIndexing

Dossier: 09547663

Legal Date: 07-03-2003

No.	Doccode	Number of pages
1	A...	1
2	REM	9
3	XT/	2
4	N/AP	2
5	LET.	1

Total number of pages: 15

Remarks:

Order of re-scan issued on